

# **PdfMerge - An Open Source Pdf Splitter/Merger with bookmark importing.**

## **Abstract**

PdfMerge was written to fill the need for producing large PDF documents from multiple sources in an automated way. To serve this need it meets the following requirements:

- Allow the split/merge process to be programmatically driven
- Allow the creation of bookmark trees by specifying bookmarks to be added
- Allow the import of bookmarks from the merged documents.
- Support merging of large documents quickly
- Allow population of document title fields
- Supports optional page numbering and footer annotation

**The license terms are as follows:**

Authors:

Charles Van Lingen (mailto:Charles.VanLingen@gmail.com)

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<http://sourceforge.net/projects/pdfmerge>

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PdfMerge is a derivative work based on:

- The PdfSharp library included as a DLL under the same license terms as above.  
<http://www.pdfsharp.net>
- Version 4.1.6 of the iTextSharp library which is included as an unmodified DLL. This library is used per the terms of the GNU LGPL and the Mozilla Public License.

Source code is available at <https://github.com/schourode/iTextSharp-LGPL>

**See additional licensing terms starting on page 8 for the iTextSharp DLL.**

## Build Information and Requirements

.NET 4.0 must be installed.

Microsoft <sup>TM</sup> Visual Studio 2015 is required to build the source code. All required project files and libraries are included.

Main Project file: *PdfMerge.sln*

## Command Line Syntax

Programmatic merge:

*Pdfmerge* <merge\_command\_file\_name> <output\_file\_name>

Original interactive merge GUI:

*Pdfmerge* <output\_file\_name>

Improved interactive merge GUI with load and save capability:

*Pdfmerge*

## Merge Command File – Plain Text Format

Merge files are used from the GUI or from the command line to perform merges programmatically.

Programmatic merge:

*Pdfmerge* <cmd\_file\_name> <output\_file\_name>

Interactive merge (original GUI):

*Pdfmerge* <output\_file\_name>

Each line of the merge file contains

<pdf filename>; <page range>; <password>; <bookmark (optional)>;level (optional)

Option	Description	Examples
<i>pdf filename</i>	Any valid pdf filename.	c:\tmp\shell.pdf compliance.pdf
<i>page range</i>	The range of pages to extract	1 (page one only) 1-4 (pages one to four) all (all pages)
<i>include</i>	If set to “exclude” bookmarks will not be imported	include exclude

<b><i>bookmark</i></b>	Optional bookmark name. If not specified file bookmarks will not be imported. If specified file bookmarks will form a sub tree under the specified bookmark.	LevelOneBookMark >SubBookMark
<b><i>level</i></b>	This is used to arrange bookmarks in a hierarchy. An exception will result if a level is skipped. The default is the root level.	1 2 3

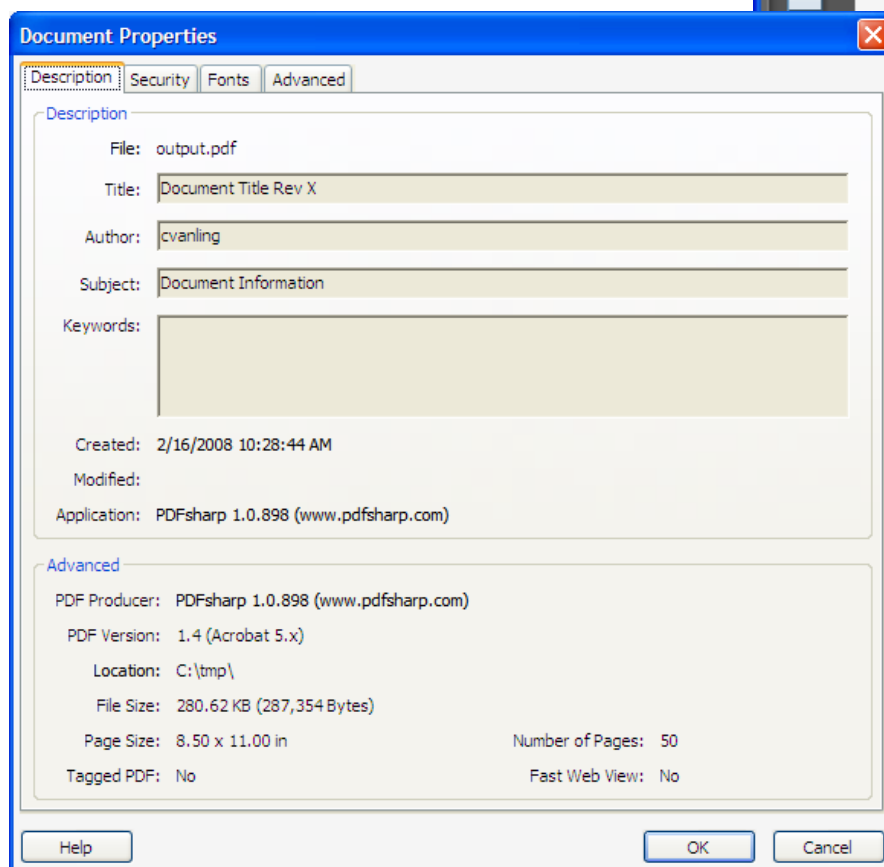
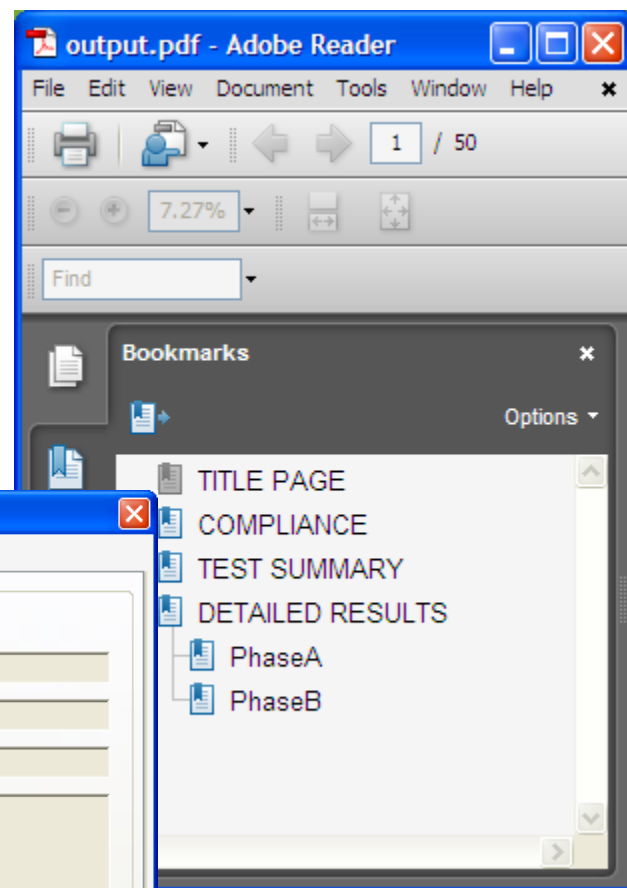
An optional information line may be added to the end:

***[Info];<Document Title>;<Document Subject>***

This information will populate the title and subject information fields in the PDF file.

This is a sample merge file and result:

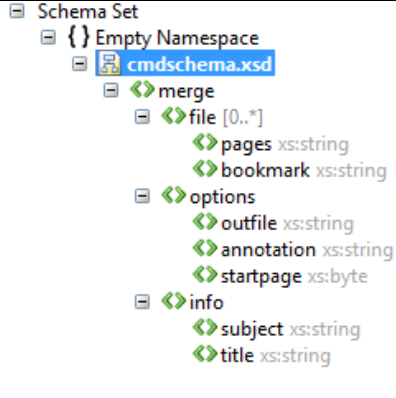
```
c:\tmp\shell.pdf;1-4;include;TITLE PAGE
c:\tmp\shell.pdf;5;include
c:\tmp\compliance.pdf;all;include;COMPLIANCE
c:\tmp\shell.pdf;6;include
c:\tmp\summary.pdf;all;include;TEST SUMMARY
c:\tmp\shell.pdf;7;include
c:\tmp\shell.pdf;8;include;DETAILED RESULTS
c:\tmp\shell.pdf;11;include
c:\tmp\phasea.pdf;all;include;PhaseA;1
c:\tmp\shell.pdf;12;include
c:\tmp\phaseb.pdf;all;include;PhaseB;1
[Info];Document Title Rev X;Document Information
```



## Merge Command File – XML Format

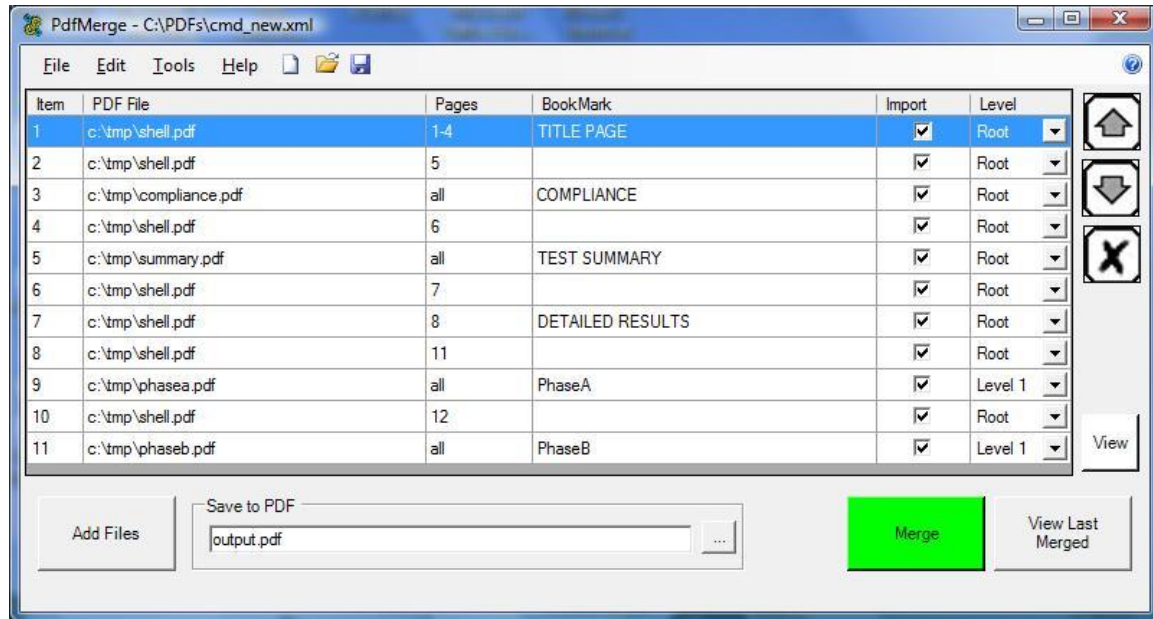
XML format is the preferred format for command files and should always be used when Unicode bookmarks are required. If you are generating XML from an external program, please ensure a utf-16 file is being created.

The XML schema and sample XML are shown below:

XML Schema	Example XML Command File
 <p>The screenshot shows the XML Schema for cmdschema.xsd. It is a Schema Set with an Empty Namespace. The schema includes a merge element with the following children: file (0..*), options, and info. The file element has attributes pages (xs:string) and bookmark (xs:string). The options element has attributes outfile (xs:string), annotation (xs:string), and startpage (xs:byte). The info element has attributes subject (xs:string) and title (xs:string).</p>	<pre>&lt;?xml version="1.0" encoding="utf-16"?&gt; &lt;merge&gt;    &lt;file&gt;     C:\tmp\distribution list.pdf     &lt;pages&gt;all&lt;/pages&gt;     &lt;bookmark&gt;Distribution list&lt;/bookmark&gt;   &lt;/file&gt;    &lt;file&gt;     C:\tmp\Agenda.pdf     &lt;pages&gt;1&lt;/pages&gt;     &lt;bookmark&gt;Agenda&lt;/bookmark&gt;   &lt;/file&gt;    &lt;file&gt;     C:\tmp\FAQ 2017.pdf     &lt;pages&gt;1-7&lt;/pages&gt;     &lt;bookmark&gt;FAQ 2017&lt;/bookmark&gt;   &lt;/file&gt;    &lt;options&gt;     &lt;outfile&gt;C:\tmp\Agenda Merged- Dec 6 2017&lt;/outfile&gt;     &lt;annotation&gt;Agenda - Dec 6 2017&lt;/annotation&gt;     &lt;startpage&gt;1&lt;/startpage&gt;   &lt;/options&gt;    &lt;info&gt;     &lt;subject&gt;Document Information&lt;/subject&gt;     &lt;title&gt;Document Title Rev X&lt;/title&gt;   &lt;/info&gt;  &lt;/merge&gt;</pre>

## GUI Usage

The main GUI is as follows:



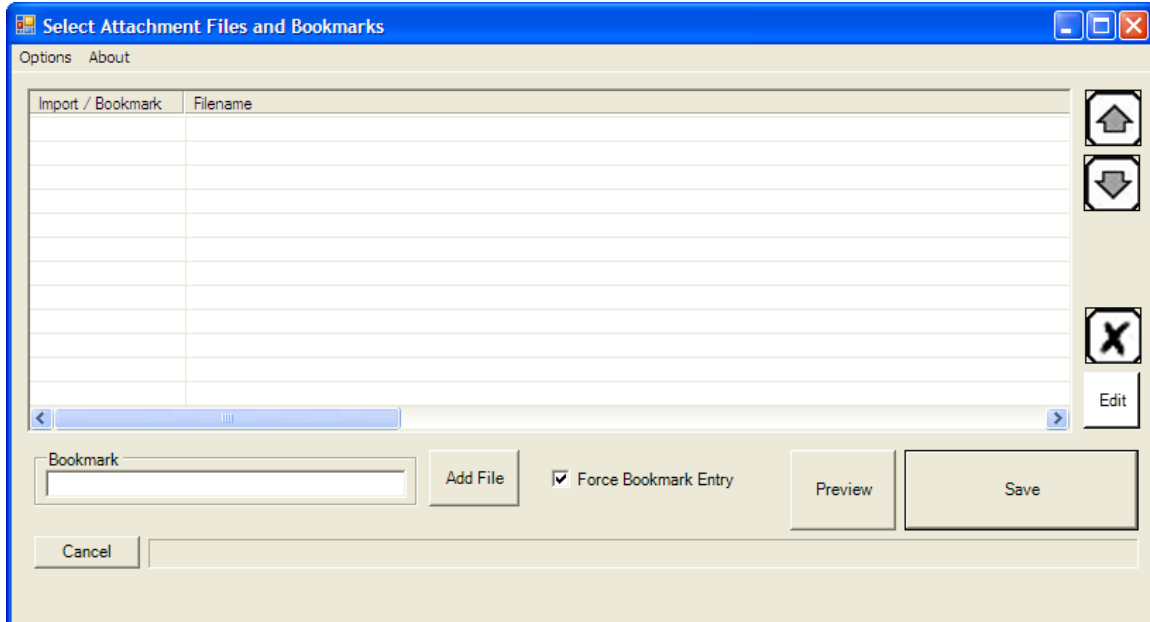
To use this GUI:

- Load a merge command file
- Drag and drop PDF files onto the window
- Click add file to add 1 or more files
- Change the bookmark names in the grid
- Select PDF filename to save the merge.
- Merge and view the last merge

This GUI supports:

- 1) Saving and loading XML format merge command files
- 2) Saving and loading ASCII format merge command files
- 3) Adding/deleting/moving files to merge/split
- 4) Selection of output filename
- 5) Starting of merge
- 6) Viewing of last merge
- 7) Viewing individual files of merge
- 8) Selection of the program to view PDF files (can also be an editor)
- 9) Editing of PDF file annotations (title, subject, and author)
- 10) Re-sizing of window

The original interactive GUI is as follows:



To use this GUI:

- Drag and drop PDF files onto the window
- Enter a bookmark name and click add file
- Change the bookmark names in the list box
- Preview result if desired
- Press "Save" to store the merged result

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